Spring Prescribed Burns to Benefit Habitat and its Wildlife

Each spring, the U.S. Fish & Wildlife Service conducts prescribed burns on federal lands called Waterfowl Production Areas (WPAs). These WPAs were purchased for the purpose of increasing the production of migratory birds, especially waterfowl. Prescribed burns are used as a management tool to maintain and improve wildlife habitat for game and non-game bird species.

One of the many benefits of prescribed burns during the months April and May is the enhancement of remnant and seeded native prairie sites. Remnant native prairie is one of the rarest plant communities found in Minnesota. Less than 1% of the original Minnesota tall grass prairie habitat remains and is found scattered across the landscape in small fragmented parcels. Properly timed prescribed burns help to stimulate native prairie plant species by removing and recycling plant litter from past growing seasons. Without burning, a native prairie site can be out-competed by introduced cool season grasses such as smooth brome, kentucky bluegrass, timothy or orchard grasses which traditionally begin to grow in early April in contrast to the warm season native prairie plants which begin to sprout in early to mid-May. Examples of common local native warm season grasses include big bluestem, little bluestem, switch and indian grass. Properly timed prescribed burns can actually stunt or kill unwanted exotic introduced grass species once green-up has occurred giving a direct advantage to the native prairie plant and forb species. Once burned, remnant native prairie sites can be harvested in the fall for the rare and valuable prairie seed. These remnant native prairie sites contain a diverse plant community. The harvested seed is then used to seed new WPA acquisitions or easements throughout the Windom Wetland Management District creating additional nesting habitat for a variety of waterfowl and grassland bird species.

One of the most common questions about prescribed burning during the spring months is "What happens to the nesting wildlife?" Undoubtedly, some ground nests are destroyed by fire during spring burns. However, pheasants and ducks respond by re-nesting. Predators typically destroy 70-80% of pheasant and duck nests. These birds maintain viable populations only because they can successfully re-nest. Pheasants have been documented to re-nest up to four times a season. To increase nesting opportunities for upland and waterfowl bird species, the District often chooses to selectively burn only a portion of a WPA. This leaves adjacent undisturbed habitat which can be immediately used by birds attempting to locate suitable nesting habitat. These unburned areas also harbor high concentrations of protein rich insects which become the primary food source for newly hatched ducklings and pheasant chicks.

Prescribed burning is used as a management tool only after careful ecological thought and planning. Before a prescribed burn, several "risk" factors are considered, including wind direction, wind speed, relative humidity, air temperature, time of year, as well as current and future weather patterns. If needed, firebreaks are created, and experienced burn crews are always on hand with the proper equipment and an additional supply of water.

If you have questions or concerns about prescribed burning and its effect on the natural resource or its wildlife, please contact Prescribed Fire Specialist, Eric Earhart at the Windom WMD 507-831-2220 ext. 15 or 1-800-577-2875 ext. 15. Additional information about the Windom Wetland Management District can be found at http://midwest.fws.gov/windom.